Discover NPSpecies

Presented by:

Author: Mark Wotawa

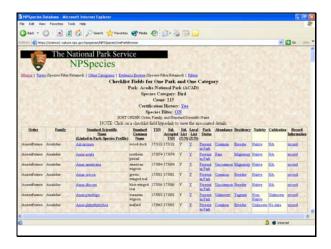
Biological Inventory Coordinator

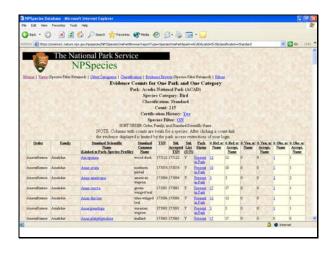
October 30, 2003

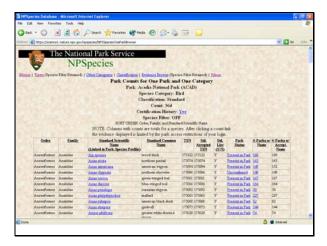
National Park Service Natural Resource Information Division Inventory and Monitoring Program



- Discover the many types of organism that are present or probably present in a park.
- Organisms are presented using the scientific name that is used in the locale of the park (i.e. the NPSpecies Local Classification).
- Certified means that the organism list has been reviewed for currency, completeness and accuracy. Only certified organism lists will be displayed.
- The goal of the first part of the biological inventories was to get definitive lists for all of the circled buttons, Organisms, Native Organisms, Non-native Organisms, and Non-Native Cultivated Organisms.

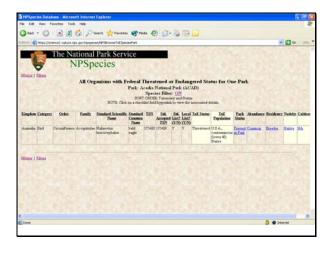






- This example displays the list of bird organisms that are in Acadia National Park (ACAD).
- The count of 215 names is a subset of the total of 364 bird names that are on the scientific name list for ACAD.
- O Clicking the hyperlinked word "ON" next to the Species Filter label at the top of the form shows that the criteria for the 215 records are the following:
- Local List = True
- Park-Status = Present in Park OR Probably Present
- Rank species or lower
- The view (columns displayed) can be changed from Checklist Fields to Evidence Counts by selecting from the Views hyperlink at the top of the form.
- Note that the filter is retained when the view is changed (we still see 215 records instead of all 364 bird records for ACAD).
- The Park Counts view shows how many other parks in the NPSpecies database have the scientific name or the Accepted Scientific Name on their lists.
- Note that the filter has been removed so that all 364 bird scientific name records for ACAD are displayed.
- Clicking the hyperlinked "50" for Anas penelope would take us to a list of all of the parks that have that scientific name on their lists.

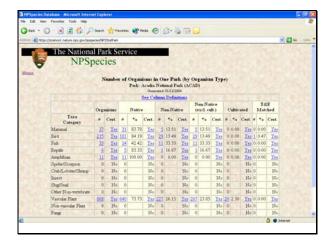




- Match to Federal T&E: Discover the organisms that are present or probably present in a park that are also on the Federal T&E "Match" data set in NPSpecies.
- The match to Federal Threatened & Endangered (T&E) was approached in a different manner than the scientific name lists.
- Rather than having all of the parks flag the scientific names that had a Federal T&E status, we used a good source (the Fish & Wildlife Service [FWS]) to match the scientific names that the parks had on their scientific name lists to the Federal T&E list.
- There are other kinds of matches, including State T&E, The Nature Conservancy (TNC) Global Ranks, and Ozone-Sensitive Species.
- The data in the match datasets are updated infrequently, so caution should be exercised in their use.
- This form displays the organisms from ACAD that have a Federal Status of Threatened (T) or Endangered (E).



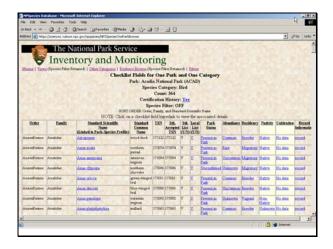
 Organism Summary: Discover comparative summary statistics for the Certified Organism Lists.



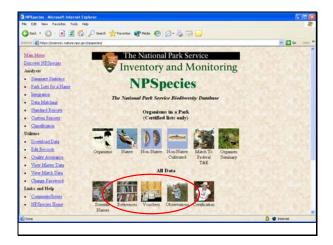
- Percentages are included for all of the lists.
- At a glance, this list provides a quick breakdown of a park's organisms.



- Scientific Names: Discover all the scientific names for a park, either because they are the names used in the locale of the park or they are obsolete names for which references, vouchers and observations may exist.
- Obsolete names may be due to a variety of reasons including synonymy, taxonomic lumping, taxonomic splitting, other taxonomic changes, spelling variations and temporal differences in classification systems as organisms are documented in references, vouchers and observations.



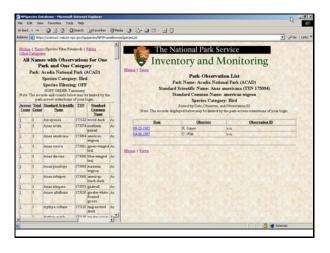
 There are many different views for the scientific names, including checklist fields (pictured), management fields, evidence counts, park counts, name links (which we will explore in a moment), and local classification.



- References: Discover the many references (e.g. reports and publications) that help document the status of each organism in each park.
- Vouchers: Discover the many vouchers (e.g. specimens, photos and audio recordings) that help document the status of each organism in each park.
- Observations: Discover the many observations (i.e. documented sightings without vouchers) that help document the status of each organism in each park.
- References are drawn directly from the NatureBib database.
- Scientific names are simply linked to a reference.



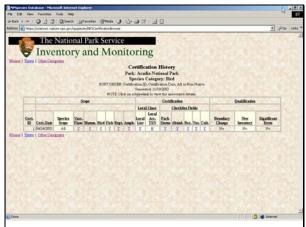




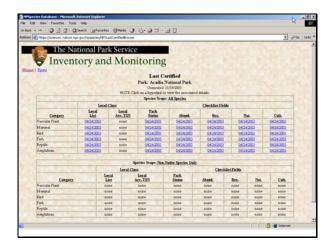
- The Access Count and the Total Count in the left frame display how many vouchers the current NPSpecies user is allowed to view and how many vouchers exist, respectively. This is based on the Access Level (parks) of the login and the sensitivity (Park-only, NPS-only, or Public) of the voucher records.
- Clicking a hyperlinked Access Count link on the left frame displays a summary of the vouchers in the right frame.
- Clicking a hyperlinked Steward/Repository in the right frame displays a voucher profile (all of the details for a single voucher record).
- Observations are displayed in much the same way as vouchers.

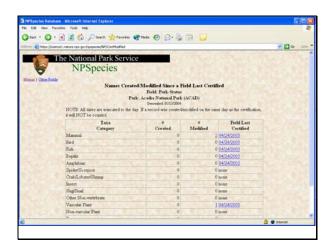


Certification: Discover the history of quality assurance reviews of each organism list for each park.

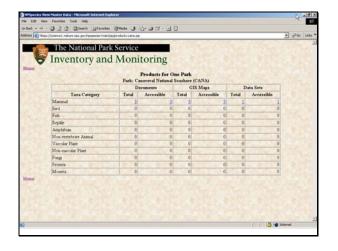


- There are several views associated with certifications (the Certification History for Checklist Fields is displayed).
- The values displayed are drawn from completed QA Certification forms.
- In this record, Acadia NP certified vascular plants, mammals, birds, fish, reptiles, and amphibians on April 24, 2003. The Local List, Park Status, Abundance, Residency, Nativity, and Cultivation were certified, but the Local Accepted TSN was not.
- This view displays when each of the checklist fields was certified for each of the taxa categories for Acadia NP.



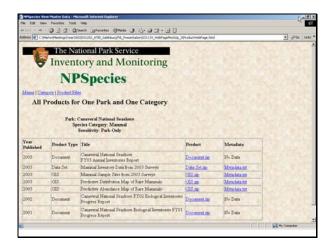






- Names Created/Modified Since a Field Last Certified provides a simple way to determine what has changed for a particular taxa category in a park since the last certification.
- Two mammal scientific name records have been modified since Acadia last certified the mammal list. If any records had been added since the last certification, those counts would be displayed in the # Created column. Clicking a hyperlinked count will jump to those records for easy review.
- O Products: Discover the products (documents, GIS maps, and datasets) that have been submitted to the I&M Office that are associated with a park.
- The Products link is still in development. It is not "live" yet in the online NPSpecies application.

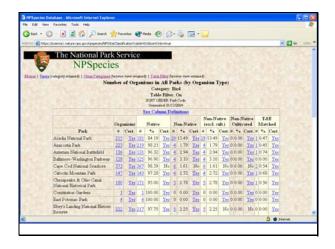
- The display is similar to that for the evidence counts.
- The Total counts and the Accessible counts will work similarly to the vouchers and observations, with access being controlled by login and product sensitivity.
- Clicking a hyperlinked count would jump to a list of those products.



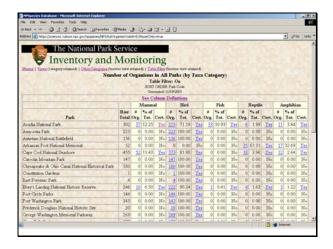
 Summary information is presented, and clicking a hyperlinked product name allows a user to download the product.



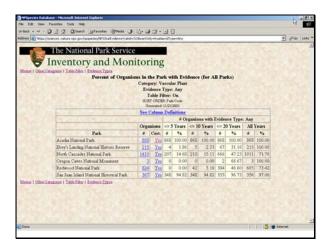
- Summary Statistics: Discover comparative summary statistics for the Certified Organism Lists, evidence, and the Scientific Name list.
- Summary Statistics allow cross-park comparisons of records.



- The columns displayed in this view show the organism types, and the rows are for different parks.
- o In this view, the table filter has been turned on so that only those bird lists that have been certified are displayed (the Cert. column under Organisms = Yes).

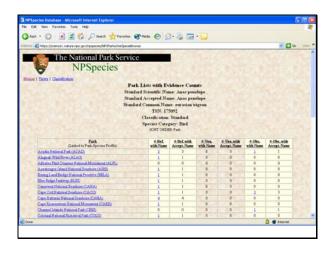


 This view displays taxa category columns, while each row shows a different park.

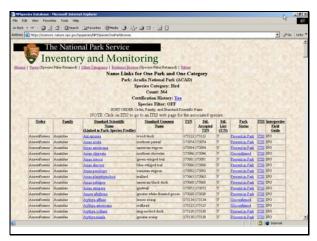


- This Summary Statistics view is useful for determining the vintage of the evidence used to support the existence of organisms in the park and whether evidence exists for all of the organisms in the park.
- In this example, about 15% of the North Cascades NP (NOCA) vascular plants have evidence that is less than 5 years old.
- About 72% of the NOCA vascular plant organisms have some form of evidence, meaning that the remaining vascular plant organisms (~28%) have no evidence.
- Park Lists for a Name: Discover all the parks that use a scientific name for an organism or for which references, vouchers or observations may exist.



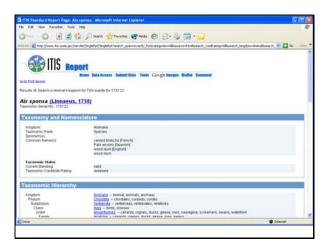






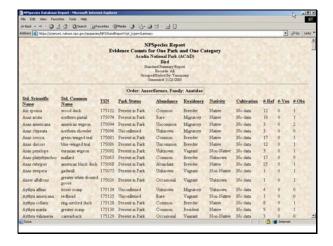
- In this example, Anas penelope, the eurasian wigeon has been selected, and the list of parks that have that name on their scientific name list are displayed.
- Clicking a hyperlinked park name displays a park-name profile, showing all information for the scientific name in the selected park.
- Clicking a hyperlinked evidence count will display the selected evidence for the organism in the park.
- Integration: Discover results of matching lists of scientific names in NPSpecies with lists of scientific names from other sources.

- Names for a park (ACAD) and a taxa category (birds) are matched to the Integrated Taxonomic Information System (ITIS) web site.
- Clicking a hyperlinked "ITIS" displays the ITIS report from the ITIS web page for the Taxonomic Serial Number (TSN).

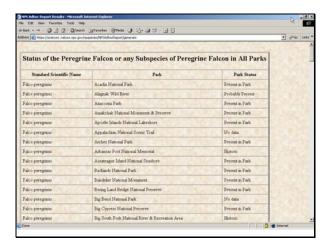


0

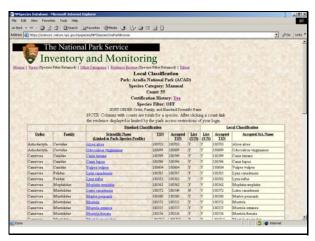




- Standard Reports: Discover the many standard reports in NPSpecies. The contents and ordering of rows and columns are already set by NPSpecies for standard reports.
- Custom Reports: Discover the POWER of custom reports in NPSpecies.
 Custom reports allow a user to conduct multi-park comparisons in NPSpecies.
 Custom reports allows a user to specify the contents of the report as well as the ordering of rows and columns.
- The standard report Evidence Counts for One Park and One Category presents the data in a printer-friendly format.
- There are several other standard reports, including reports for references, vouchers, observations, and match data.
- Most standard reports can be displayed in either summary or detailed format.

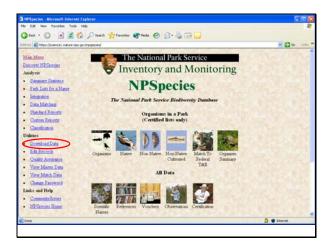






- This custom report "Status of the Peregrine Falcon or any Subspecies of Peregrine Falcon in All Parks" was created to answer an actual question received from the Washington Office.
- The title of the report, the fields that are displayed, the order of the fields, the records that are displayed, and the order of the records were all userdefined
- This powerful tool can be used to retrieve data across all parks in NPSpecies with complicated criteria.
- Classification: Discover the differences between the Local Classification determined by NPS users and the NPSpecies Standard Classification which is determined by information provided by the Integrated Taxonomic Information System (ITIS).

 Here ACAD's mammal list is displayed with columns for both Standard Classification and Local Classification. The Local Classification can be reviewed quickly from this view and it can be compared with the Standard Classification.



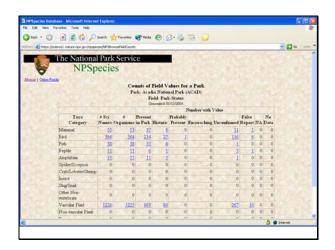
- Download Data: Discover all of the NPSpecies data for a park in the MS Access NPSpecies Desktop Application format.
- The Download Data link allows a user to download data for any park in the Access Privileges of their login.



- Edit Records: Allows a user with a login that has editor Access Privilege to add/edit/delete records for the parks in their Access Level.
- A user with a login that has author
 Access Privilege can add new records
 or edit records that they have added for
 the parks in their Access Level.



 Quality Assurance: Provides tools to help users review their data for inconsistencies and gaps.



- Counts of Field Values for a Park quickly reveal areas where the data can be improved, such as determining the correct Park-Status value for the records that are currently "Unconfirmed".
- Clicking a hyperlinked record count will display those records in the Checklists Fields view.